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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/671,078	09/25/2003	Robert Parlee	parlee01.005	5824
25247	7590	07/21/2006	EXAMINER	
GORDON E NELSON PATENT ATTORNEY, PC 57 CENTRAL ST PO BOX 782 ROWLEY, MA 01969			KUHN, ALLAN R	
			ART UNIT	PAPER NUMBER
			1732	

DATE MAILED: 07/21/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/671,078

Applicant(s)

PARLEE, ROBERT

Examiner

Allan Kuhns

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 15 May 2006.  
2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.  
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 17-24 is/are pending in the application.  
4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.  
6) ☒ Claim(s) 17-19 and 24 is/are rejected.  
7) ☒ Claim(s) 20-23 is/are objected to.  
8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.  
10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)  
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)  
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.  
4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.  
5) ☐ Notice of Informal Patent Application (PTO-152)  
6) ☐ Other: \_\_\_\_\_.

1.The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2.Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over Bishop et al. (5,019,312) as set forth in previous Office actions. It is submitted that the initial paragraph of the remarks filed May 15, 2006 serves as an admission that the microballoons and adhesive disclosed by Bishop et al. are an expandable element, as in instant claim 17.

3.Claims 18 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bishop et al. as applied to claim 17 above, and further in view of Baron (4,954,209) as set forth in the rejection of claim 17 in the Office action mailed April 24, 2006.

4.Claims 19 and 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bishop et al. as applied to claim 17 above, and further in view of Wong et al. (5,665,461). Wong et al. disclose the aspect of incorporating a syntactic film in a lay-up. It is submitted that expandable syntactic films are within the purview of Wong et al. because it is stated at column 1, line 20 that thermoplastic microspheres may be employed. It would have been obvious to one of ordinary skill in the art to incorporate the use of a syntactic film, as taught by Wong et al., into the method of Bishop et al. due to the ease of handling of the syntactic films, as disclosed by Wong et al. at column 2, lines 7-24.

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5.Claim 20 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

6.Applicant's arguments filed May 15, 2006 have been fully considered but they are not persuasive. Applicant argues that claim 17 expressly points out that the element that expands during the cure is an expandable element that has the function of expanding during the cure. But Applicant's statements in the initial paragraph of the "Remarks" are an admission that Bishop et al. include the use of an expandable material or element in their process.

Applicant also argues that one of ordinary skill in the art would not be motivated to add Baron's silicon layers to Bishop's mold because Bishop's mold could just be tightened. The examiner disagrees because the expandable material of Baron appears to offer a simpler alternative to one of ordinary skill in the art.

Applicant further argues that the expansion elements which are used by Baron are for use in much larger molds than those molds used for forming bicycle lugs. This is not persuasive because it is the examiner's position that one of ordinary skill in the art is capable of adjusting the size or scale of an expandable element to be useful in a smaller size mold.

7.Any inquiry concerning this communication or earlier communications from the examiner should be directed to Allan Kuhns whose telephone number is (571) 272-1202. The examiner can normally be reached on Monday to Thursday from 7:00 to 5:30.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christina Johnson, can be reached on (571) 272-1176. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

*Allan R. Kuhns*

ALLAN R. KUHN  
PRIMARY EXAMINER AU 1732

7-17-06